

Application No.: 10/720,684
Amdt. dated March 3, 2005
Reply to Office Action dated December 3, 2004

Docket No.: 9988.093.00

CLAIMS

This listing of claims are currently pending.

Listing of Claims:

1. (Original) A gas drier comprising:

an igniter, connected to a first terminal providing a power signal with respect to a neutral terminal, for initiating a flame;

a normally closed flame detection switch, connected between said igniter and the neutral terminal to receive the power signal via said igniter, for detecting a presence of the initiated flame by opening; and

a sustaining relay for providing an alternative path of conduction with respect to said flame detection switch.

2. (Original) A gas drier comprising:

an igniter having a first terminal connected to a power supply terminal to ignite a gas;

a flame detection switch having a first terminal connected to a second terminal of said igniter, to maintain a closed state at a normal operating state time, said flame detection switch being a normally closed type switch that is opened when a flame of the igniter is detected;

a thermostat switch having one terminal connected to a second terminal of said flame detection switch, to maintain a closed state at a normal operating state, said thermostat switch being a normally closed type switch that is opened by a detection of a state of overheating;

a first valve coil having one end grounded;

a second valve coil having one end connected to the first terminal of said flame detection switch;

a sustaining relay comprising:

an operating coil having one end connected to the other end of said first valve coil

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and the other end grounded; and

a pair of contacts respectively connected across said flame detection switch; and
a rectifier bridge having an output terminal tied in common to said first and second
valve coils and the operating coil of said sustaining relay and a pair of input terminals
respectively connected to said sustaining relay and the first terminal of said flame detection
switch.

3. (Original) The apparatus as claimed in claim 2, wherein the contacts of the
sustaining relay maintain an open state at the normal operating state and are switched to a closed
state when power from said rectifier bridge is applied to the operating coil.

4. (Previously Presented) The apparatus as claimed in claim 2, further comprising a
rectifying diode connected, anode-to-cathode, from the first terminal of said flame detection
switch to the corresponding contact of said sustaining relay.